

Docket No. AUS920000752US1

**CLAIMS:**

What is claimed is:

- 5 1. A method for reporting failures, comprising:  
detecting a predetermined number of consecutive  
correctable errors;  
storing a description for each of the predetermined  
number of correctable errors;  
10 determining whether the descriptions for the  
predetermined number of correctable errors are the same;  
and  
reporting a bit line or driver failure if the  
descriptions for the predetermined number of correctable  
15 errors are the same.
2. The method of claim 1, wherein the step of detecting  
a predetermined number of correctable errors comprises  
performing a periodic scan for a processor.
- 20 3. The method of claim 1, wherein the step of storing a  
description for each of the predetermined number of  
correctable errors comprises storing the descriptions in  
an error data structure.
- 25 4. The method of claim 3, wherein the error data  
structure comprises an error table.
5. The method of claim 3, further comprising:  
clearing the error data structure if an

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uncorrectable error occurs before detecting the predetermined number of consecutive correctable errors.

6. The method of claim 1, wherein the step of reporting  
5 a bit line or driver failure comprises:  
creating an error log; and  
returning the error log to an operating system.

7. The method of claim 1, wherein the predetermined  
10 number is five.

8. The method of claim 1, wherein each description  
comprises an address at which an error occurred and an  
error signature that indicates which bit is bad.


15 9. The method of claim 1, further comprising:  
deconfiguring the processor if the descriptions for  
the predetermined number of errors are the same.

20 10. The method of claim 9, wherein the step of  
deconfiguring the processor comprises dynamically  
deconfiguring the processor.

11. The method of claim 9, wherein the step of  
25 deconfiguring the processor comprises deconfiguring the  
processor at boot time.

12. The method of claim 1, further comprising:  
replacing the processor if the descriptions for the  
30 predetermined number of correctable errors are the same.

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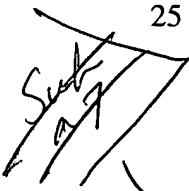

13. An apparatus for reporting failures, comprising:  
detection means for detecting a predetermined number  
of consecutive correctable errors;  
storage means for storing a description for each of  
5 the predetermined number of correctable errors;  
determination means for determining whether the  
descriptions for the predetermined number of correctable  
errors are the same; and  
reporting means for reporting a bit line or driver  
10 failure if the descriptions for the predetermined number  
of correctable errors are the same.

14. The apparatus of claim 13, wherein the detection  
means comprises performing a periodic scan for a  
15 processor.

15. The apparatus of claim 13, wherein the storage means  
comprises an error data structure.

20 16. The apparatus of claim 15, wherein the error data  
structure comprises an error table.

17. The apparatus of claim 15, further comprising:  
means for clearing the error data structure if an  
25 uncorrectable error occurs before detecting the  
predetermined number of consecutive correctable errors.

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18. The apparatus of claim 13, wherein the reporting  
means comprises:  
30 means for creating an error log; and  
means for returning the error log to an operating

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system.

19. The apparatus of claim 13, wherein the predetermined number is five.

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20. The apparatus of claim 13, wherein each description comprises an address at which an error occurred and an error signature that indicates which bit is bad.

10 21. The apparatus of claim 13, further comprising:  
deconfiguration means for deconfiguring the processor if the descriptions for the predetermined number of errors are the same.

15 22. The apparatus of claim 21, wherein the deconfiguration means comprises means for dynamically deconfiguring the processor.

20 23. The apparatus of claim 21, wherein the deconfiguration means comprises means for deconfiguring the processor at boot time.

24. The apparatus of claim 13, further comprising:  
means for replacing the processor if the  
25 descriptions for the predetermined number of correctable errors are the same.

25. An apparatus for reporting failures, comprising:  
a processor; and  
30 a memory, coupled to the processor, having stored therein an error data structure,

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wherein the processor detects a predetermined number of consecutive correctable errors, stores a description for each of the predetermined number of correctable errors in the error data structure, determines whether  
5 the descriptions for the predetermined number of correctable errors are the same, and reports a bit line or driver failure if the descriptions for the predetermined number of correctable errors are the same.

10 26. The apparatus of claim 25, wherein the processor detects a predetermined number of consecutive correctable errors by performing a periodic scan for the processor.

27. The apparatus of claim 25, wherein the error data  
15 structure comprises an error table.

28. The apparatus of claim 25, wherein the processor reports a bit line or driver failure by creating an error log, and returning the error log to an operating system.  
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29. The apparatus of claim 25, wherein the predetermined number is five.

30. The apparatus of claim 25, wherein each description  
25 comprises an address at which an error occurred and an error signature that indicates which bit is bad.

31. A computer program product, in a computer readable medium, for reporting failures, comprising:  
30 instructions for detecting a predetermined number of consecutive correctable errors;

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*sub B1* instructions for storing a description for each of  
the predetermined number of correctable errors;

instructions for determining whether the  
descriptions for the predetermined number of correctable  
5 errors are the same; and

instructions for reporting a bit line or driver  
failure if the descriptions for the predetermined number  
of correctable errors are the same.

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